

[54] **COATED INTRAOCULAR LENS**

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Related U.S. Application Data

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[58] **Field of Search** **623/6, 66; 502/158; 427/2, 54.1, 93; 522/100; 525/531; 351/160 R, 160 H**

References Cited

U.S. PATENT DOCUMENTS

3,279,996 10/1966 Long, Jr. et al. 623/2 X
3,566,874 3/1971 Shepherd et al. 351/160 H
4,240,163 12/1980 Galin 623/6
4,260,725 4/1981 Keough et al. 351/160 H X
4,338,377 7/1982 Beck et al. 428/429 X
4,647,282 3/1987 Fedorov et al. 351/160 R X

FOREIGN PATENT DOCUMENTS

2556665 6/1977 Fed. Rep. of Germany 623/6

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[57]

ABSTRACT

An improved intraocular lens is coated with a non-smudging biologically compatible hydrophobic cross-linked vinyl-containing silicone polymer coating material, such as polymethylvinyl siloxane or polymethylphenylvinyl siloxane. The coating material is inert, does not smudge upon contact with another surface, reduces damage on contact with the intraocular tissue, particularly the endothelium, and prevents intraocular lens induction of inflammation. The coating material or matrix preferably contains at least one optically compatible medicament which can be gradually and controllably released therefrom with time and which makes the lens suitable for implantation in both the phakic and aphakic eye. The coating material may further contain a small amount of fine particle size fumed silica.

22 Claims, No Drawings